

Asbestos and Lead Paint A Cost Perspective

**Cost Specific Information on
Asbestos and Lead Paint
Abatement**



Managing the Cost Impact

- Asbestos and Lead Paint are everywhere the Crops does work. The presence of these materials can make or break a budget.
 - With some planning and knowledge based on experience you can control the cost impact.
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Asbestos Definitions

□ Friable

- Book Definition: Material can be crushed by the pressure of two fingers.
- Practice: Material will release fibers during the abatement process.

□ Non-Friable

- Book Definition: Can not be crushed
 - Practice: Will not release fibers during abatement process
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Asbestos Abatement Process

- ☐ Locate all ACM
 - ☐ Select appropriate removal method
 - ☐ Install containment structure
 - ☐ Abatement ACM
 - ☐ Clean-up and wipe-down containment
 - ☐ Test containment for free fibers
 - ☐ Remove containment
 - ☐ Test general area for fibers
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Abatement Definitions

□ Wipe-down

- Process where all surfaces within the containment structure are cleaned by either a wet rag or a HEPA vacuum wipe

□ Containment Structure

- Site fabricated structure used to limit the spread of fibers during removal

□ Aggressive Air Sampling

- Air sampling process where the air is agitated via a leaf blower
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Gross Removal

□ PPE

- Supplied air respirators
- Full body suits

□ Hot working conditions

- Winter work
- Cool packs

<http://apps.em.doe/OST/mainpubs.asp>

□ Cost data / MCACES-RACER



Intact Removal and NonFriable

- Reverse assembly
 - PPE
 - PAPR or Negative Air
 - Enclosure
 - Only doors and windows
 - Limited wipe-down
 - Cost data / MCACES-RACER
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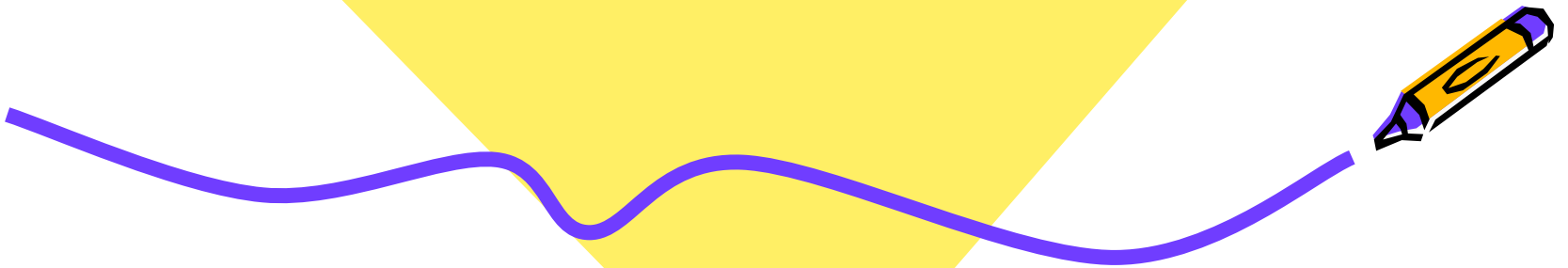


Other Asbestos Cost Issues

- ☐ Wage rates
 - ☐ Sampling
 - ☐ Cost data
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Questions



Lead Paint

Lead Containing Paint

-  Not a regulated material
-  Can be a disposal issue

Lead Based Paint

-  Regulated material



Defining the Scope of the Project




 Lead Paint Survey

 Hazards Survey






Lead Paint Survey

Coupon Test

-  Highly reliable
-  Slow process
-  Cost independent of volume

X-Ray Fluorescence Test (XRF)

-  Low cost
-  Cost decreases with volume
-  Not highly reliable



Hazard Survey

Damaged Surfaces

-  Chipped

-  Crazed

-  Flake

Friction and Impact Surfaces

-  Sliding

-  Impact

Chew Surfaces



Lead Paint Abatement

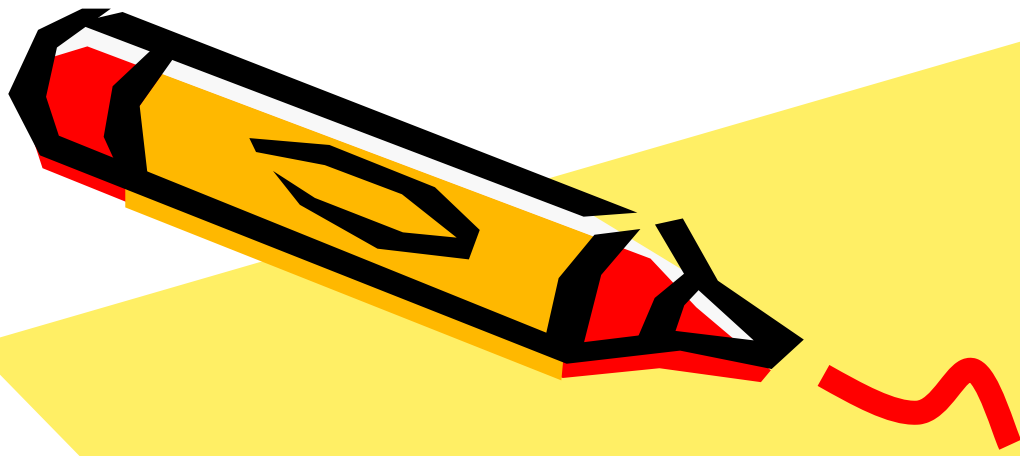
- Chemical Strippers and Similar
- Abrasive Techniques
- Heat Gun
- Mitigation
 - Encapsulate
 - Routine cleaning



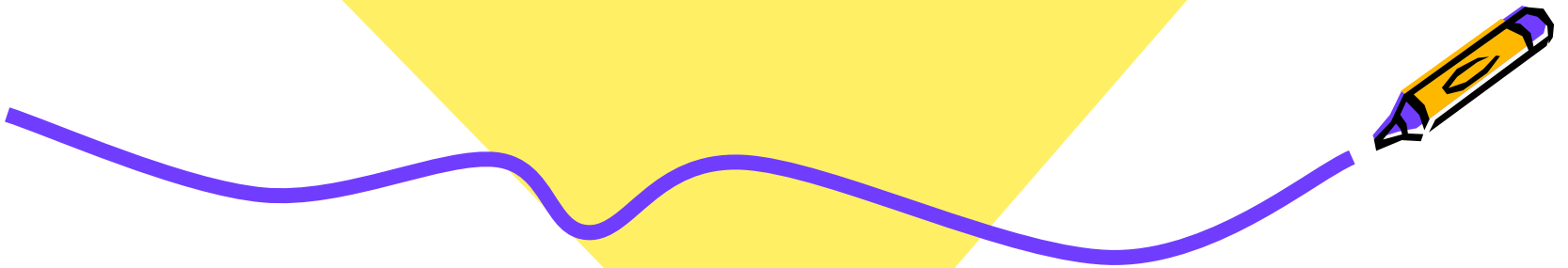
Building Demolition with Lead Paint

- Demolition does not constitute abatement
- Debris need not be segregated
- Debris may not need to be tested





Questions



Biological Contaminate

- No well defined process for clean-ups
- No well defined criteria as to proper disposal
- Most cases the process of abatement leaves a clean site with no residual

Teaming

- ✦ Get involved early
- ✦ Be process knowledgeable
- ✦ Expand your costing skills into the design phase
- ✦ Keep “value” in mind

